



Sample Business Case

Sample Business Case

Project Name: System Development Life Cycle

Channel: CIO

Project Sponsor: Helene Epstein

Project Lead: Connie Davis

Project Description

Describe the need for change (the business problem to be addressed).

In 1998 the SFA procured and adopted Andersen Consulting's Method One as SFA's SDLC methodology. Today, Andersen no longer supports the Method One product. The CIO organization maintains the need to have a System Development Life Cycle (SDLC) methodology to guide the modernization development activities in a structured, methodical repeatable manner.

Upon completion of the SFA Modernization Blueprint, the SFA formed Integrated Product Teams (IPTs) to implement modernization initiatives. During the 2nd quarter of FY 2000, Andersen developed an IPT Process for SFA. It consisted of SDLC life cycle phases, with IV&V and milestone reviews, and deliverable templates. Several IPT's began to use the IPT Process.

Feedback from its use and management reviews have indicated a need to convert the IPT process into a full and open SDLC that is object oriented and can be supported by SFA's selected standard development tools (i.e. Rational Tool Suite and Rational Unified Process). The new SDLC will consist of an expanded set of roles and responsibilities and be deployed with orientation and formal training courses to the IPTs.

What is the purpose of the initiative?

The purpose of this initiative is to provide SFA with a comprehensive Information Technology SDLC methodology in the form of an operational handbook. This initiative also includes the development and delivery of SDLC orientation and training for various audiences within SFA.



Sample Business Case

What is the scope of the initiative, including what it is not?

The scope of this initiative is to convert the existing IPT process into a full SDLC. It will describe the use of tools and templates, a repeatable development process, deliverable outcomes, signoff controls, roles and responsibilities, and change management. The scope includes mainstreaming the SDLC within the SFA IPT structure using a deployment strategy of orientations, training and continual process improvement. First, the SDLC will incorporate the use of the Rational Rose tool suite, object oriented approach and configuration management to produce functional system requirements, entity relationship diagrams, data flow diagrams, test plans, test scripts. Secondly additional tools will be incorporated to tie the life cycle and tools altogether.

The scope of the SDLC begins when an Investment Decision approves a new initiative during the Investment Review Process and ends with the deployment of the system. Although the SDLC interfaces with and incorporates templates used in investment reviews and acquisition/procurement, the SDLC scope does not include the Investment Review, Acquisition and Procurement, or Operations and Maintenance processes.

What is the start date and end date of the initiative?

The start date is 4th quarter of FY 2000. Improvements to the SDLC are continuous.

What other business areas/external groups are affected by the implementation of this initiative and how are they affected?

For each funded modernization initiative an IPT will be staffed with SFA business area and Modernization Partner contractor personnel. The IPT will be required to use the SDLC to guide the implementation of the modernization project. Therefore, all SFA business areas and modernization contractors are affected by the implementation of this initiative.

What systems are impacted by the implementation of this initiative and how are they impacted?

This initiative will provide standard processes within the SDLC that will impact any system created or modified, during a modernization project.



Sample Business Case

What business processes are impacted by the implementation of this initiative and how are they impacted?

SFA's core Business Process, per se, will not be impacted by the implementation of this initiative. But, the Information Technology Management process of the Enterprise Services Business Area, as defined by the SFA Modernization Blueprint will be impacted. The IT Management process ensures that SFA's systems have common standards, are secure, readily integrate and interface with channel partners, and keep pace with new technologies and technology requirements. The specific sub-processes that will be impacted by this initiative are (IT-03) IT Systems Development Lifecycle, (IT-07) IT Standards and Methodology and (IT-10) IT Quality Assurance.

Technologies Used

List the proposed technologies that will be used to implement this project

Name/type	Proposed use	Has technology been used at SFA before? Where?	Does Technology fit SFA's Architecture Standard? Explain.	Does SFA have the technical expertise to implement this technology? Why?
<i>Rational Rose Tool Suite</i>	<i>Integrate tool into SDLC</i>	<i>No</i>	<i>Yes. The Rational Rose tool suite is the standard life cycle methodology tool.</i>	<i>Yes, via Modernization Partner support.</i>
<i>Rational Unified Process (RUP)</i>	<i>Basis for creating Object Oriented processes in SDLC</i>	<i>No</i>	<i>Yes. The standard Rational Tool Suite is based on the RUP.</i>	<i>Yes, via Modernization Partner support</i>
<i>SEI Capability Maturity Model (CMM)</i>	<i>Use as a framework for ensuring that best practices are incorporated into the</i>	<i>Yes, when SFA contractor's implemented projects at CMM level 2 or</i>	<i>Yes, it provides for an open life cycle.</i>	<i>Yes, via Modernization Partner and their subcontractors.</i>



Sample Business Case

	<i>SDLC.</i>	<i>higher.</i>		
--	--------------	----------------	--	--

Benefits

Provide a narrative discussion to explain why SFA is doing the initiative and what project objectives or expected outcomes can be quantified and how can they be measured. Demonstrate that the initiative supports the goals and objectives of SFA, how it supports these goals and objectives, to what extent it helps SFA achieve these goals and objectives and when these benefits will be realized.

Reduce Unit Cost

Quantified Benefit (\$)	How will benefit be measured/realized?	When will benefit be realized?
<i>Reduction in the number of scope and requirements changes during the build phase of the SDLC.</i>	<i>The SDLC will require projects to track changes via the requirements and change management processes.</i>	<i>As projects begin tracking change requests, a decrease in overall changes during the build phase should begin to occur.</i>
<i>Reduction in the number of problem reports and cost of rework during the testing and acceptance phases of the SDLC.</i>	<i>The SDLC will require projects to undergo IV&V reviews, track problem reports and cost of rework during testing and acceptance phases.</i>	<i>As projects undergo IV&V reviews and implement corrective actions, the number of problem reports and cost of rework should be reduced, due to better quality assurance.</i>
<i>Assumptions</i>		



Sample Business Case

Increase Customer Satisfaction

Quantified/Qualitative Benefit	How will benefit be measured/realized?	When will benefit be realized?
<i>Reduction in changes resulting from customer reviews and signoff.</i>	<i>The SDLC will require that the results of customer reviews are documented and the amount of changes monitored.</i>	<i>When the time for customer reviews and sign off are reduced as a result of reduced comments and changes.</i>
<i>Customer satisfaction is measured as a direct result of acceptance testing and operations.</i>	<i>The SDLC will require that projects measure customer satisfaction via surveys etc. at project initiation and as a part of acceptance and operations.</i>	<i>When a direct improvement of customer satisfaction can be compared against an established baseline for each project.</i>
<i>Assumptions</i>		

Increase Employee Satisfaction

Quantified/Qualitative Benefit	How will benefit be measured/realized?	When will benefit be realized?
<i>Employees have a greater understanding of their roles on an IPT.</i>	<i>IPT members will provide feedback on the orientation and/or training of the SDLC. The IPT members will provide feedback on the use of the SDLC.</i>	<i>Positive feedback from orientation and training courses and through the use of the IPT the need for SDLC modifications is reduced over time.</i>
<i>Assumptions</i>		



Sample Business Case

Estimated overall dollar amount of all benefits listed above.

Quantified Benefits					
BY	BY+1	BY+2	BY+3	BY+4	Total
Assumptions					
<i>The SDLC is vital to SFA's success in guiding the Integrated Product Teams. The use of a standard SDLC should reduce both the overall IT resources spent on software maintenance and the amount of a development time devoted to testing and rework below 50%. It also will incorporate best practices to ensure that SFA development is efficient, cost effective and uses standards.</i>					

Costs

Provide costs, including those to implement the initiative and the costs to support it over its useful life.

COSTS						
	BY	BY+1	BY+2	BY+3	BY+4	Total
Development	<u>250,000</u>					<u>250,000</u>
Operations						
Prod. Proc						
Key Pers.						
Ad Hoc						
Sys. Maint.		<u>75,000</u>	<u>75,000</u>	<u>75,000</u>	<u>75,000</u>	<u>300,000</u>
Telecom.						
Data Center						
Sub. Ops						
Total	<u>250,000</u>	<u>75,000</u>	<u>75,000</u>	<u>75,000</u>	<u>75,000</u>	<u>550,000</u>
Assumptions						



Sample Business Case

*If funding is not approved for BY then the need will be carried over to BY+1 to total \$325,000.
Costs for BY + 1 through 4 includes enhancements to the SDLC and associated training courses*

Total Cost of Ownership

What is the level of required enhancement after implementation?

The level of required enhancements after implementation is unknown at this time and will be based on feedback from orientation, training and use of the SDLC.

What is the life span of this initiative?

According to the modernization blueprint, the need and use of an SDLC is considered a core sub-process of the IT Management business process. Its improvement is continuous and depends on the pace of changes to the SFA organization and the ever-changing technologies, tools and methodologies created for systems development.

Alternatives

Discuss what could be done in place in this initiative and describe the consequences of each alternative.

Alternative	Consequence
Remain as-is	<i>SFA will not have a clear methodology, best practices, templates etc for developing SFA systems.</i>
Non-technology solution	N/A
Enhance an existing system	N/A
Implement on a	N/A



Sample Business Case

smaller scale	
Other	N/A

Risks

Risk	Description of Risk	Mitigation Strategy
Financial	<i>Funding is exhausted and the SDLC is incomplete.</i>	<i>Award a fixed price performance based task order.</i>
Technology	None	None
Scope	None	None
Management	None	None
Exposure	None	None

Acquisition Strategy

Sources (Indicate the prospective sources of supplies or services that can meet the need of this project. List the most likely offerors for the requirement, and/or the manufacturer and model of the equipment that will most likely be offered).

Modernization Partner management with Impact Innovations completing the SDLC and providing training.



Sample Business Case

Competition (Describe how competition will be sought, promoted, and sustained throughout the course of the acquisition, including any performance requirements that will be required).

Contemplated award to the Modernization Partner contract with Impact Innovations as the subcontractor.

Contract Considerations (For each contract contemplated, discuss contract type selection; use of multiyear contracting, options, or other special contracting methods, ex: performance-based).

Firm fixed price and performance-based.

Schedule/Milestones (including acquisition cycle)

#	Milestone	Start Date	End Date
1	<i>Request Proposal</i>		<i>8/17/00</i>
2	<i>Receive Proposal</i>		<i>8/28/00</i>
3	<i>Review and Approve Proposal</i>		<i>8/31/00</i>
4	<i>Award Task</i>		<i>9/30/00</i>
5	<i>Task Work Plan</i>		<i>10/13/00</i>
6	<i>Tool Integration</i>		<i>10/27/00</i>
7	<i>Draft SDLC operations handbook</i>		<i>11/10/00</i>
8	<i>Final SDLC operations handbook</i>		<i>12/22/00</i>
9	<i>Proposed Training Plan</i>		<i>10/27/00</i>
10	<i>Final Training Plan</i>		<i>11/10/00</i>
11	<i>SDLC Training Content</i>		<i>1/19/01</i>
12	<i>Deliver SDLC Training</i>		<i>2/2/01</i>